

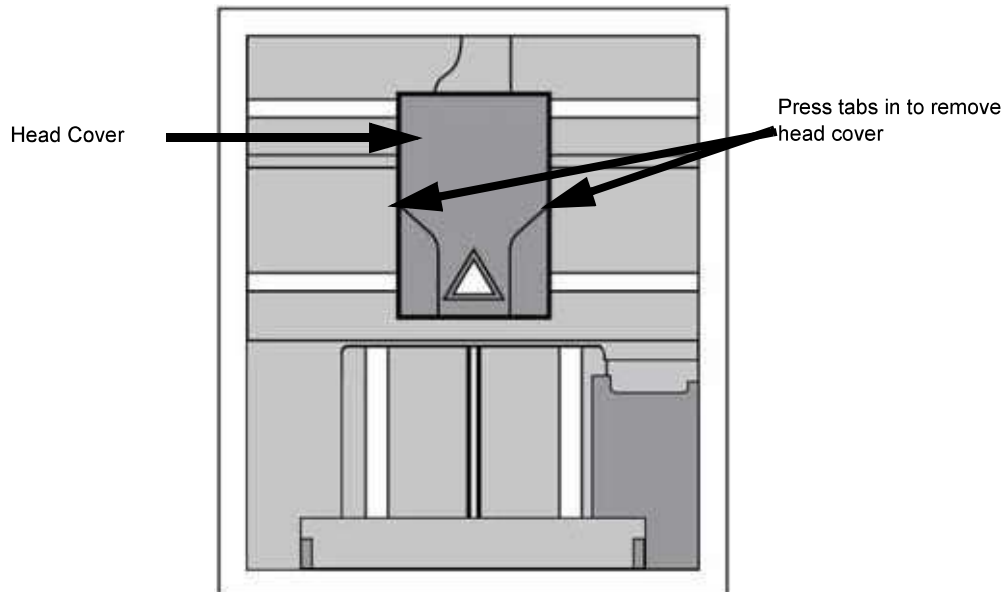
RECOVERING FROM LOSS OF EXTRUSION



Note: It is recommended that you read and understand this entire procedure before performing any of the work.

1. Enter **Head Maintenance** mode.
 - A. From **Idle**, press **Maintenance**.
 - B. Press **Machine**.
 - C. Press **Head**. The head will heat up to operating temperature which will take approximately 3 minutes.
2. Remove the head cover by pressing the tabs in and pulling away from the head. See [Figure 6-4](#).

[Figure 6-4](#): Remove the head cover



3. Place the toggle bar in neutral position (bar will extend equally from both sides of head). This can be done manually - push on the extended bar end. See [Figure 6-5](#).

Figure 6-5: Head Components

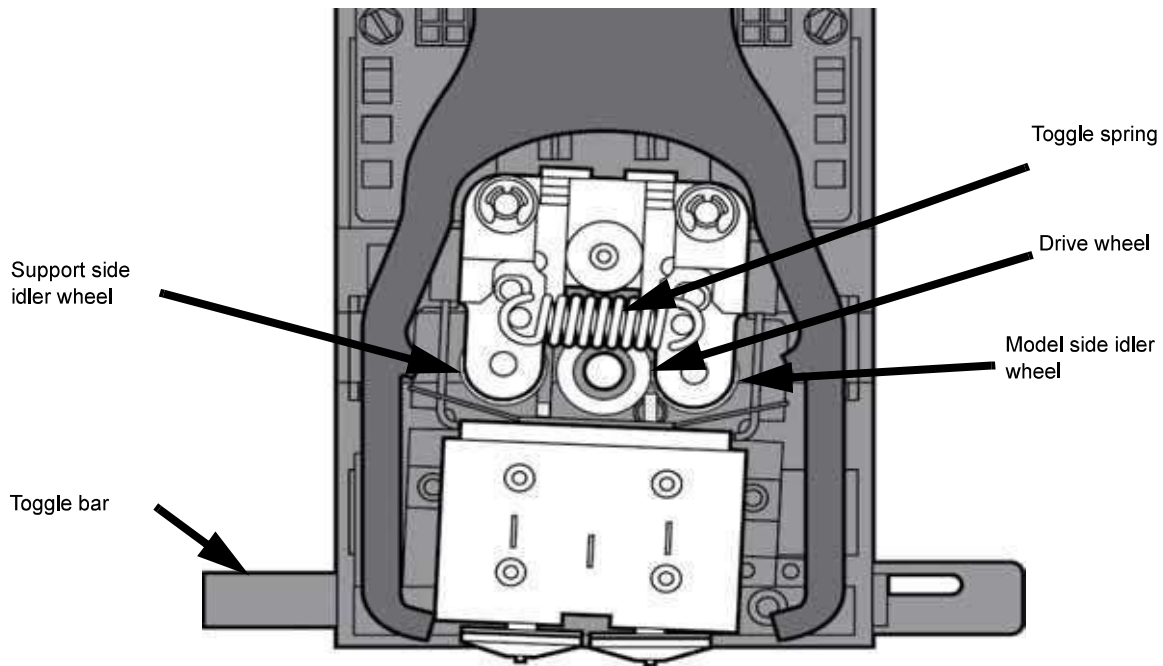
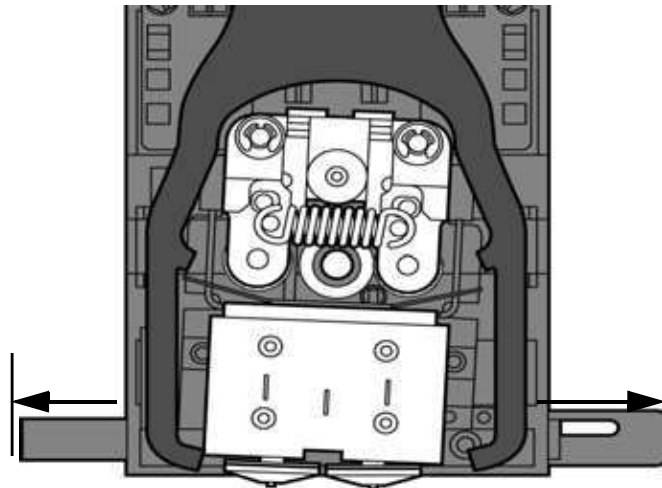


Figure 6-6: Toggle bar in neutral position



4. Remove any excess material found around the head area.



Note: Material fed to the tip can sometimes jam causing a build-up of material under the head cover.

- A. Clean out as much of the material as possible using needle nose pliers, a probe, or equivalent tool.



Caution: The end of the tip where the material enters is called the extrusion tube. Extrusion tubes are fragile. Use care when working in this area so as to avoid damage to the tubes.

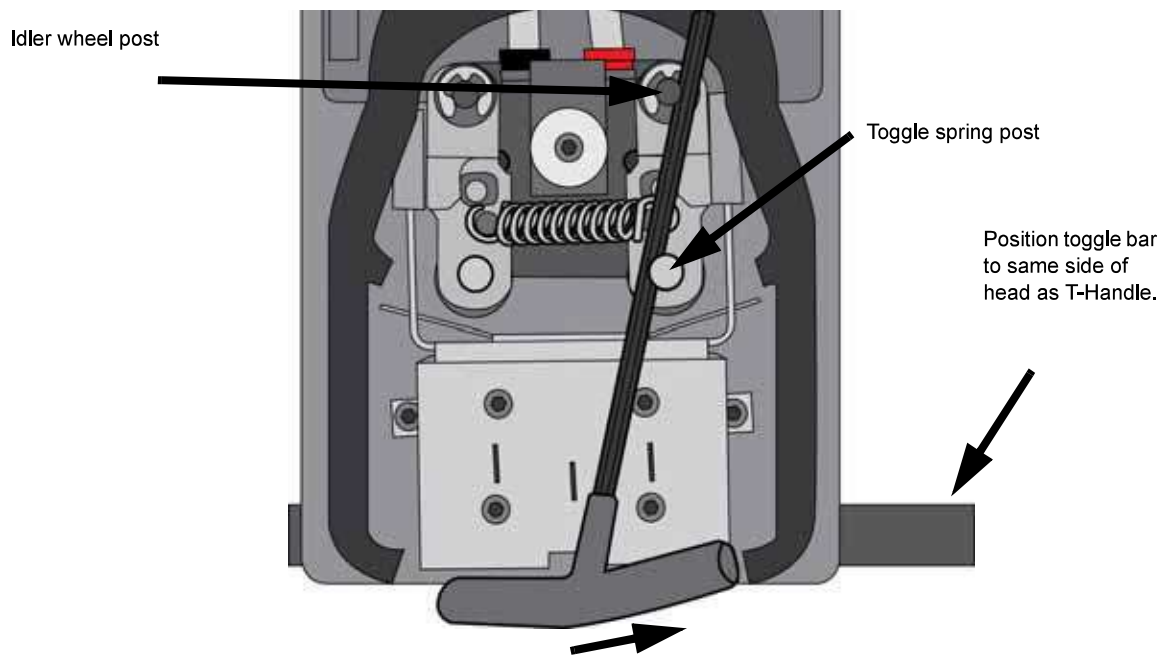
- B. For easier access to areas that may need to be cleaned, move the material idler wheels out of the way (there is one idler wheel for support material and one for model material, (see Figure 6-5).



Note: Move only one idler wheel assembly at a time. Finish cleaning around the moved wheel and restore it to its normal position before moving the other idler wheel. Having both wheels out of position simultaneously could stretch the spring.

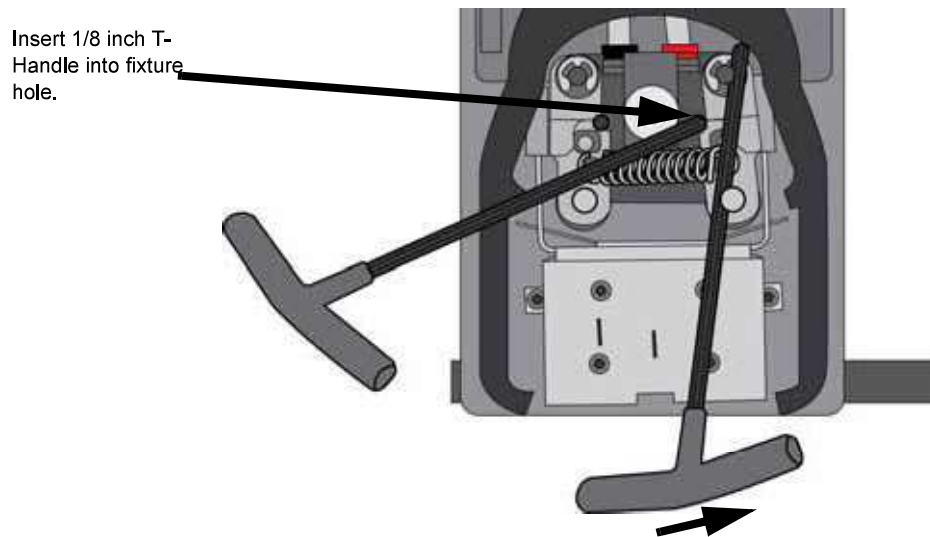
- i. Place a $\frac{7}{64}$ " T-Handle Allen wrench between the toggle spring post and the idler wheel post as illustrated in Figure 6-7 (model side shown).
- ii. Position toggle bar to the same side of the head as the T-Handle allen wrench. See Figure 6-7 (model side shown).

Figure 6-7: Create access space for cleaning - model side shown



- iii. Move idler wheel assembly by pushing with $\frac{7}{64}$ " T-Handle Allen wrench against spring tension. Insert a $\frac{1}{8}$ " T-handled Allen wrench (from startup kit) into the fixture hole. See Figure 6-8.

Figure 6-8: Holding access space open - model side shown



- iv. Ease pressure on the $\frac{7}{64}$ " T-Handle Allen wrench to carefully return the leveraged idler wheel back toward its original position - until the idler assembly is resting against the $\frac{1}{8}$ " T-Handle Allen wrench.
 - v. Remove the $\frac{7}{64}$ " T-Handle Allen wrench.
- C. Cut the material above the idler wheel using a cutters.
- D. Clean the area that is now accessible using a needle nose pliers, a probe or equivalent tool.



Note: Make sure that all loose material is removed from the affected area.

- E. Reposition the $\frac{7}{64}$ " T-Handle Allen wrench between the toggle spring post and the idler wheel post.
 - F. Move idler wheel assembly by pushing with $\frac{7}{64}$ " T-Handle Allen wrench against spring tension and remove the $\frac{1}{8}$ " T-handled Allen wrench.
 - G. Remove the $\frac{7}{64}$ " T-Handle Allen wrench.
5. Repeat for the opposite side as needed.
6. Replace the head cover.



Note: If the head cover is not replaced the printer may not function properly.

7. Press **Done** on the display panel.
8. Display will ask **Which Materials Loaded?** Press **Model** if only model material is loaded, press **Support** if only support material is loaded or press **Both** if both model and support material are still loaded. Press **None** if neither are loaded.

9. Display will ask you to remove the cartridge of the materials that are not loaded. Remove the cartridge and cut the excess material.
10. Press **Done** until back at **Idle**.
11. Reload the material that is not loaded.